Dyna surgical and prosthetic cassettes

Cleaning procedure

Cleaning and sterilization of Dyna surgical cassettes, instruments and abutments

PAY ATTENTION! FIRST USE

All cassettes, instruments, drills, abutments and other parts need to be cleaned and sterilized before first use, because they are packed under non-sterile conditions!

Clean → Disinfect → Sterilize

For more information about cleaning, disinfection and sterilization, please carefully study the content of this leaflet.
Cleaning procedure

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1. Cleaning

- Remove any organic or inorganic debris immediately after surgery to prevent micro-organisms from staying alive and getting spread. In particular hollow objects deserve extra attention. Use brushes or a water pressure pistol for this;
- Remove tarnish on an instrument by scrubbing it by hand with a plastic brush using fumigator (e.g. Neodisher® MediClean Dental, art. no.: 405333) and water, or by use of equipment, such as an ultrasonic cleaner;
- Instruments consisting of two or more parts must be disassembled before cleaning;
- After cleaning rinse instruments with distilled or demineralized water and then dry them immediately.

2. Disinfection

- With disinfection the micro-organisms are being reduced to an acceptable level. Disinfection should be limited to situations in which sterility isn't necessary, but in which cleaning reduces the contagion inadequate. If disinfection is necessary, thermic disinfection using an instrument washing machine is preferred instead of chemical disinfection. If thermic disinfection isn't possible, because instruments are not resistant to that, use legally allowable disinfectants (e.g. Neodisher® MediClean Dental, art. no.: 405333 in combination with Neodisher® MediKlar Dental, art. no.: 477649). Dry to the air.

3. Sterilization

- Sterilization is necessary for critical instruments, substances and such, which directly have contact with sterile tissues or organs. Sterilization takes place in a steam sterilizer/autoclave;
- Make sure the instruments are completely dry before sterilization;
- Steam sterilization (autoclave) is recommended. Specified sterilization conditions shall be based on established time/temperature relationship for the specific process (e.g. 121 °C during a minimum time of 15 minutes as recommended by the European Pharmacopoeia or 134 °C during a minimum time of 3 minutes);
- Packed instruments must be dry when they are taken out of the sterilizer; wet packings are permeable for bacteria, whereby the contents aren’t sterile anymore. In case of doubt the instruments must be sterilized again before use.

4. Storage

After sterilization, dry instruments may be stored in their sealed packages in a clean and dry environment until they are used in treatment. The packaging of all sterilized instruments, parts and drills should be labeled with the date of sterilization and expiry date of the sterilization process. In any doubt, the instruments should be submitted for re-sterilization prior to use in patient care.

Water marks

Some brownish marks on sterilized products are often mistaken as rust. These brown marks are mainly located in places that are not easily accessible during cleaning and the rinsing process (for example hinges). You can prevent these marks by thoroughly rinsing with reverse osmosis or distilled water and ensuring they are completely dry prior to sterilization. To avoid water marks on any stainless steel surface during sterilization, distilled water only should be used in the autoclave as this contains no dissolved solids. If any other type of water is used, the solids dissolved in the water will be left behind as the instruments dry, thus leaving marks on the instruments/cassettes.

Corrosion

If disinfecting and ultrasonic cleaning baths are used for too long a period between solution changes, the concentration of the solution is increased by evaporation. If the instruments are not properly rinsed, then during the sterilization process, these residues can burn and become brown. Infrequently and only superficially a form of corrosion can be caused by contact with a strong acidic or caustic solution. This is usually the result of rust coming from some instruments of a lesser quality stainless steel. When you do end up with brown marks, the cleaning set (ref. 119960) helps remove these marks effectively and recover the brightness of the stainless steel finish.

Please note:

- Cassettes are made of stainless steel 304L or PPSU.
- The cassettes can be cleaned in ultrasonic baths, thermic disinfectors, chimiclaves and autoclaves.
- Regarding the Dyna torque wrench we refer to the enclosure;
- Storage of Dyna instruments and drills in physiologic saline solution is not allowed;
- Do not place dissimilar metals (stainless steel, copper, chrome plated, etc.) in the same cleaning cycle;
- Instruments, parts and drills must not come into contact with each other to prevent damage;
- Always follow manufacturer’s instructions on cleaning devices.

Below the way of decontamination is being described

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<td>Cleaning and packed sterilization</td>
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Category A: Invasive operations in which contact with sterile tissue is taking place.
Category B: Operations with provable risks as a result of transmission of micro-organisms.
Category C: Operations in which risk of transmission is very small.

Dyna Dental Engineering B.V. recommends reading additional information on infection control and management of hazardous materials in dental practice available on the market.